

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions, and listings, of claims in the application.

1 1. (Currently Amended) A method for predicting whether an on-line shopper will be
2 converted into becoming a purchaser of an item based on sales promotions offered by an on-line
3 vendor, comprising the steps of:

4 storing customer profile information corresponding to a plurality of on-line shoppers;

5 storing customer web log information corresponding to the plurality of on-line shoppers;

6 storing ~~promotion~~-attributes corresponding to a plurality of sales promotions that have
7 been offered;

8 inputting the customer profile information, the web log information and the ~~promotion~~
9 attributes corresponding to the plurality of sales promotions into a model for simulating, by a
10 computer, shopping behavior as a function of the customer profile information and the ~~promotion~~
11 attributes corresponding to the plurality of sales promotions; and

12 offering promotions based on the model.

1 2.-3. (Canceled)

1 4. (Original) The method of Claim 1, wherein the model comprises a logistic
2 regression model.

1 5. (Canceled)

1 6. (Previously Presented) The method of Claim 4, wherein the model is based on
2 traditional logistical regression theory and on the maximum utility theory.

1 7. (Currently Amended) The method of Claim 1, wherein the customer profile
2 information includes one or more of age, sex, religion, income, ethnicity, marital status,
3 geographical location, number of children, interests, hobbies, spending habits, and zip code.

1 8. (Currently Amended) The method of Claim 1, wherein the customer web log
2 information includes one or more of ~~contains~~ data regarding when a customer accessed a web
3 site, how long the customer visited the web site, which items were of interest, how the customer
4 heard about the web site, whether the customer saw a promotion, whether the customer was
5 motivated to taking action as a result of the promotion, whether the customer inspected an item,
6 whether the customer put the item back, whether the customer bought the item, and a quantity of
7 items purchased.

1 9. (Currently Amended) The method of Claim 1, wherein the ~~promotion~~-attributes
2 corresponding to the plurality of sales promotions include ~~at least one or more~~ of sales, upgrades,
3 extended warranties, buy-one-get-one free, financing packages, free options, rebates, coupons,
4 donations to charities, and free gifts.

1 10. (Currently Amended) A computer-readable medium having stored thereon
2 instructions for predicting whether an on-line shopper will be converted into becoming a
3 purchaser of an item based on sales promotions offered by an on-line vendor, the instructions
4 comprising the steps of:
5 storing customer profile information corresponding to a plurality of on-line shoppers;
6 storing customer web log information corresponding to the plurality of on-line shoppers;
7 storing ~~promotion~~-attributes corresponding to a plurality of sales promotions that have
8 been offered;
9 inputting the customer profile information, the web log information and the ~~promotion~~
10 attributes corresponding to the plurality of sales promotions into a model for simulating shopping
11 behavior as a function of the customer profile information and the ~~promotion~~-attributes
12 corresponding to the plurality of sales promotions; and
13 offering promotions based on the model.

1 11.-12. (Canceled)

1 13. (Original) The computer-readable medium of Claim 10, wherein the model
2 comprises a logistic regression model.

1 14. (Canceled)

1 15. (Previously Presented) The computer-readable medium of Claim 13, wherein the
2 model is based on traditional logistical regression theory and on the maximum utility theory.

1 16. (Currently Amended) The computer-readable medium of Claim 10, wherein the
2 customer profile information includes one or more of age, sex, religion, income, ethnicity,
3 marital status, geographical location, number of children, interests, hobbies, spending habits, and
4 zip code.

1 17. (Currently Amended) The computer-readable medium of Claim 10, wherein the
2 customer web log information includes one or more of ~~contains~~ data regarding when a customer
3 accessed a web site, how long the customer visited the web site, which items were of interest,
4 how the customer heard about the web site, whether the customer saw a promotion, whether the
5 customer was motivated to taking action as a result of the promotion, whether the customer
6 inspected an item, whether the customer put the item back, whether the customer bought the
7 item, and a quantity of items purchased.

1 18. (Currently Amended) The computer-readable medium of Claim 10, wherein the
2 ~~promotion~~-attributes corresponding to the plurality of sales promotions include ~~at least one or~~
3 more of sales, upgrades, extended warranties, buy-one-get-one free, financing packages, free
4 options, rebates, coupons, donations to charities, and free gifts.

1 19. (Currently Amended) ~~[[A]]~~The method of ~~according to~~ Claim 1, further
2 comprising a step of using the model to tailor sales promotions to individual shoppers.

20. (Currently Amended) ~~[[A]]The method of according to~~ Claim 19, wherein sales promotions automatically are customized to a shopper based on customer profile information for said shopper.

21. (Currently Amended) ~~[[A]]The method of according to~~ Claim 1, further comprising steps of storing product information corresponding to a plurality of products offered for sale by the on-line vendor and inputting the product information into the model, and wherein the shopping behavior also is simulated as a function of the product information.

22. (Currently Amended) ~~[[A]]The method of according to~~ Claim 1, further comprising a step of using the model to compute a percentage likelihood that a shopper will be converted into becoming a purchaser.

23. (Currently Amended) ~~[[A]]The method of according to~~ Claim 1, further comprising a step of using the model to simulate a conversion of a shopper into a purchaser.

24. (Currently Amended) ~~[[A]]The method of according to~~ Claim 1, further comprising steps of using a simulator based on the model, varying ~~promotion~~-attributes corresponding to the plurality of sales promotions input into the simulator, and then observing results generated by the simulator.

25. (Currently Amended) ~~[[A]]The method of according to~~ Claim 1, further comprising a step of continuously updating and improving the model based on new information.

26. (Currently Amended) ~~[[A]]The method of according to~~ Claim 1, further comprising a step of using an optimization engine to generate statistically driven sales promotion plans that have been optimized with respect to at least one objective function.

27. (Previously Presented) The computer-readable medium of Claim 10, wherein the instructions further comprise a step of using the model to tailor sales promotions to individual shoppers.

1 28. (Previously Presented) The computer-readable medium of Claim 27, wherein
2 sales promotions automatically are customized to a shopper based on customer profile
3 information for said shopper.

1 29. (Previously Presented) The computer-readable medium of Claim 10, wherein the
2 instructions further comprise steps of storing product information corresponding to a plurality of
3 products offered for sale by the on-line vendor and inputting the product information into the
4 model, and wherein the shopping behavior also is simulated as a function of the product
5 information.

1 30. (Previously Presented) The computer-readable medium of Claim 10, wherein the
2 instructions further comprise a step of using the model to compute a percentage likelihood that a
3 shopper will be converted into becoming a purchaser.

1 31. (Previously Presented) The computer-readable medium of Claim 10, wherein the
2 instructions further comprise a step of using the model to simulate a conversion of a shopper into
3 a purchaser.

1 32. (Currently Amended) The computer-readable medium of Claim 10, wherein the
2 instructions further comprise steps of using a simulator based on the model, varying ~~promotion~~
3 attributes corresponding to the plurality of sales promotions input into the simulator, and then
4 observing results generated by the simulator.

1 33. (Previously Presented) The computer-readable medium of Claim 10, wherein the
2 instructions further comprise a step of continuously updating and improving the model based on
3 new information.

34. (Previously Presented) The computer-readable medium of Claim 10, wherein the instructions further comprise a step of using an optimization engine to generate statistically driven sales promotion plans that have been optimized with respect to at least one objective function.

35. (Currently Amended) A method for predicting what types of on-line shoppers will make purchases based on offered sales promotions, comprising:
obtaining profile information for a plurality of shoppers;
obtaining a set of ~~promotion~~-attributes pertaining to sales promotions that were offered to the shoppers;
obtaining behavioral information regarding on-line shopping behaviors of the shoppers;
based on the behavioral information, using by a computer, a mathematical model to relate the ~~promotion~~-attributes pertaining to the sales promotions to the profile information in order to estimate effectiveness of a particular sales promotion with respect to at least one specified shopper; and
offering promotions based on the mathematical model.

36. (Canceled)

37. (Currently Amended) ~~[[A]]The method of according to~~ Claim 35, further comprising a step of using the mathematical model to tailor sales promotions to individual shoppers.

38. (Currently Amended) ~~[[A]]The method of according to~~ Claim 37, wherein sales promotions automatically are customized to a shopper based on customer profile information for said shopper.

39. (Currently Amended) ~~[[A]]The method of according to~~ Claim 35, further comprising steps of using a simulator based on the mathematical model, varying ~~promotion~~ attributes pertaining to the sales promotions input into the simulator, and then observing results generated by the simulator.

1 40. (Currently Amended) ~~[[A]]The method of according to~~ Claim 35, further
2 comprising a step of continuously updating and improving the mathematical model based on new
3 information.

1 41. (Currently Amended) ~~[[A]]The method of according to~~ Claim 35, further
2 comprising a step of using an optimization engine to generate statistically driven promotion
3 plans that have been optimized with respect to at least one objective function.

1 42. (Currently Amended) ~~[[A]]The method of according to~~ Claim 35, wherein the
2 ~~promotion~~ attributes pertaining to the sales promotions include ~~at least one~~ or more of sales,
3 upgrades, extended warranties, buy-one-get-one free, financing packages, free options, rebates,
4 coupons, donations to charities, free gifts, discount rate, free shipping and handling, rebate and
5 special event promotional discount.